

*Q. What advice would you give to a person interested in Easter Island archaeology or anthropology (or these fields generally)?*

A. Never believe what you read, or even what I write. Keep your imagination and your critical senses intact. But above all, always place every fact into its context, as far as is possible

*Q. What are you currently reading?*

A. Anything that comes within sight. Especially pictures. Anything on African art, the history of archaeology, the history of voyaging, the global circulation of trade objects: clay pipe, beads, flintstone, etc – all the insignificant and indispensable things that join humans together. But no novels since I was twenty.

*Q. Date and place of birth?*

A. 3 September 1944 at Montrouge in the suburbs of Paris, France.

## REVIEWS

### **"The Dynamics of Soil, Landscape, and Culture on Easter Island (Chile)"**

by Andreas Mieth and Hans-Rudolf Bork

in

*Soils and Societies: Perspectives from Environmental History.*

J. R. McNeill and Verena Winiwarter, eds.  
White Horse Press (2006); ISBN 1-874267-52-9.  
Hard cover (369 pages); \$95 from Amazon.com

*Review of Chapter 10 by Shawn McLaughlin*

This book covers a lot of territory, from the general subject of soil itself to its nutrient value, from its exploitation in various places around the world to, of course, human interaction with the stuff that mudpies are made of and it reveals how populations either rise or fall because of agricultural savvy in applying what we've learned about a substance we've been walking on over the centuries. The book combines geomorphology, archaeology, pedology, and history; its geographical spread includes Mesoamerica, Africa, Europe, Australia, India, and Easter Island. It reveals ways in which soils and their properties and histories have influenced human relationships in different parts of the world.

There are 11 chapters (listed at the end of this review) along with biographical notes on the editors and authors, a fairly comprehensive index, plus references appear at the end of each chapter. Interspersed here and there are a few tables and black and white line drawings and photos, but the paper stock is fairly coarse and the halftones used aren't

very fine, so the resolution is mediocre at best.

Because of space constraints, and because the focus of the *Rapa Nui Journal* is Easter Island specifically, and Oceania generally, this review is really about Chapter 10 – "The Dynamics of Soil, Landscape and Culture on Easter Island (Chile)" by Andreas Mieth and Hans-Rudolf Bork, whose names should by now be familiar to Rapanuiphiles and Easter Island researchers. However, the emphasis on Chapter 10 should in no way be considered a negative reflection on the content or merit of the other chapters.

Described as "a delight for the soil aficionado" by Camilla Toulmin in *Nature* (2006), *Soils and Societies* is about why dirt, dust, sand, mud, and all the other terms we use, some of them pejoratively, are vital to the survival of the human race and this is perhaps no more true than on Easter Island. So soil is the foundation (no pun intended) upon which all civilization depends. Fans of James Bond novels and films may recall that he can tell the quality of the wine he's drinking on the basis of the quality of the soil in which the grapes were grown and yet, despite esoteric popular media references such as this, since contemporary Western metropolitan societies tend to be especially isolated from farming practices and the importance of soil<sup>1</sup>, this book is useful for developing an understanding of how humans have survived because of our knowledge and cultivation of soil itself. The renaissance of "organic" food has also meant a return to the kind of knowledge farmers need to properly exploit the landscape to better serve the growing needs of a world population that has now reached 6 billion and is projected to reach 9 billion by 2042.

There's no shortage of research to account for how humans have changed their environment and the soils upon which they've lived, from the once heavily forested areas surrounding the now largely barren landscape of Stonehenge (North 1996; Castleden 1998) to the Four Corners of the American Southwest where we know the Anasazi were responsible for not only deforestation but for re-routing water systems that some say may have exacerbated drought conditions that forced them to abandon the area (Thomas 2000; Plog 1997) to, of course, Easter Island's deforestation and all the controversies surrounding it – where, rather than largely rats alone or El Niño/Southern Oscillation or Little Ice Age phenomenon, it was likely a constellation of factors – including human behavior – that denuded the landscape, eroded the soil, and crippled the land (Hunt and Lipo 2007; Bahn and Flenley 1992; Flenley and Bahn 2003; Diamond 2005; Stevenson and Haoa 1999).

So where do Mieth and Bork take us in Chapter 10? It is difficult to disassociate this chapter with their very fine volume *Easter Island - Rapa Nui: Scientific Pathways to Secrets of the Past* and this is probably no accident because so much of the latter is devoted to the soil properties of Easter Island. So it should come as no surprise to find similarities. This is relevant only in so far as I'm reviewing a

<sup>1</sup> How many people, for example, realize the existence or purpose, let alone importance, of crop rotation to counteract the buildup of pathogens and pests and to balance fertility demands of various crops to avoid excessive depletion of nutrients like nitrogen?

single chapter of a book and the similarities wouldn't necessarily stand out so much otherwise.

The chapter, which runs 49 pages, is divided into three main sections – an introduction, a discussion of reconstruction of the landscape and land-use development based on stratigraphic and paleo-ecological methods, and a summary of the soil and landscape history of Easter Island. These three main sections are further sub-divided into 23 subsections which cover many areas – from the special role of islands in ecological and land use research to settlement history in the South Pacific and Easter Island, to state of knowledge of land use and soil erosion in prehistoric and historic times, as well as discussions of climate, geo-ecological characteristics, soil fertility, and, finally, the Poike Peninsula. This gives the reader a general sense of what the authors have attempted to do – mainly cull together two discrete aspects of Easter Island's soil and culture in a variety of different ways, some of which overlap with each other, some of which touch on new information and ideas, and some of which seem to be borrowed, as one might expect, from *Easter Island - Rapa Nui: Scientific Pathways to Secrets of the Past*.

From the very beginning the authors note that island ecosystems are particularly sensitive to “anthropogenic impact” and they relate that there has been much discussion about negative modifications in land-use practices and the extent to which these phenomena can be attributed to indigenous island peoples or the introduction of European influences. Early on they devote a great deal of text on how much research *hasn't* been devoted to various areas, such as ecological effects of prehistoric and historical land use on Easter Island; no systematic use of geo-archives for identifying different techniques and phases of horticulture; that nothing is known of the effects of various types of historic and prehistoric land use on soils and soil erosion; they note that the destructive effect of intensive cattle farming since the late nineteenth century on the vegetation is described (by Skottsberg) but not the effects of over-grazing on the soils; even the causes of the large-scale erosion that is prominent in the eastern part of the island is described as “yet unknown”. They refer to conclusions about plant life and deforestation drawn by Bahn and Flenley (1992), but assert that they based their argument almost exclusively on the palynological analysis of the crater sediments of three volcanoes rather than landform analysis tied in with soil and sediment strategies for understanding vegetation and landscape change. In short, the authors conclude, not much is known “beyond the level of conjecture” on many of these areas. These statements are delivered not as criticisms but as observations that further proof and more systematic studies are needed, though I suppose those who have come before might take umbrage with the implication that their studies weren't complete or comprehensive enough.

Early sections of the chapter are devoted to discussions of the arrival of settlers, the location of settlement, the age of the island, the reliability or radiocarbon dates, and,

interestingly enough, they ponder whether Easter Island's isolation persisted after the first settlers had reached the island, whether other groups of Polynesians arrived in later times, whether there were contacts with other islands of Polynesia, or whether there may have even been contacts with the South American continent”.<sup>2</sup>

While they note “evidence of intensive colonisation”... “from numerous house foundations still visible in the countryside, stone-mantled ovens dug into the ground (*umu*), and platforms more than 150 m long in places and 3 m high (*ahu*)...” they also note that “No one knows how many people lived on Easter Island during the heyday of the *moai* culture” and observe that the maximum population figures postulated (e.g., 8,000 to 10,000) have no reliable basis. “All figures presented”, they conclude, “are extrapolations from an inferred number of the original population or have been estimated from the settlement structures found (Flenley and Bahn 2003)”.

A brief discussion of the sweet potato then ensues, with an appraisal of likely dates of its arrival in eastern Polynesia and, of course, Easter Island, and they cite Stevenson et al. (*Rapa Nui Journal* 16(1):17-22, 2002) in examining archaeological evidence for various phases of horticulture, including (a) extensive gardening in coastal areas c. 800 CE; (b) movement of cultivation areas into lower midlands by 1100 CE; (c) emergence of plantings on middle and upper slopes of volcanoes by 1250 CE; and (d) the general intensification in coastal areas as well as higher slopes by the early 1400s. There is, as Stevenson points out, a correlation between intensified horticulture with the introduction of the sweet potato that took place at about that time.

As if to reinforce the lack of what is known, the next section includes contradictory reports of early European visitors. Behrens, for example, traveling with Roggeveen in 1722, describes the island as having areas “planted and well divided into fields” that are “well kept” and that “fields and trees” carry “abundant fruit”. But Forster, traveling with Cook in 1774, describes the island as being “so extremely infertile that not more than twenty different species grow on it”; fields, he says, “take up by far the least part of the otherwise waste-lying land”. Then La Pérouse in 1786 describes intensive agriculture in the west coast area with what he claims is 10 percent of the island cultivated, followed by Routledge in 1914 who estimates that about 50 percent of the island was suitable for growing sweet potatoes and bananas. These are not meant to suggest error but to show differences not only in observation but in evident land-use over time.

In the next section, citing Grau (1998) the authors deliberately chose to use *Jubaea chilensis* instead of *Paschalococos dispersa* as the extinct Easter Island palm and it is here that I interject my take on the subject, as there is a tendency amongst some Easter Island researchers to do this when there appears to be little reason for it. The extinct palm *may* have been *Jubaea*; it *may* have looked like *Jubaea*, but from what has been collected on the island and

<sup>2</sup> Apropos of this, see *The Implications of the sweet potato's re-appraisal* by Shawn McLaughlin in this issue.

analyzed, the extinct palm has *not* actually been definitively identified as *Jubaea*; that's why we have a different name for it. They may be distant cousins or fraternal twins, but if what we had was *Jubaea* – definitively – there would be no need for another name for this palm.<sup>3</sup>

Speaking of definitive conclusions, it is here, in this section, that the authors cite Bahn and Flenley (1992) as unequivocally attributing deforestation to man-made forest clearing and the authors delve further into this pronouncement with a discussion of charcoal from trees found in favor of charred remains of grasses in the fireplaces of several settlements dating from the 17<sup>th</sup> century onward, which they take as evidence of a reduced forest vegetation. They also note that recent intensive sheep grazing towards the end of the 19th century caused the removal of any remaining tree or shrub vegetation.

The authors then return to the practice of noting the absence of reliable data on, in this case, things such as estimates of rainfall in the higher altitudes and on the windward side of the volcanoes compared to coastal areas and the leeward side of the mountains because these data are important for interpretation of prehistoric horticultural techniques. Similarly, they report that reliable information on former soil fertility or on indications of soil erosion in the literature is scarce and that some authors have inferred *former* cultivation conditions from the *present* state of the soils. They go on to say that neither temporal nor regional differentiation of soil erosion has been undertaken, nor has there been any calculation of erosion balances. They conclude that, "as yet there are ... no reliable studies on soil erosion in prehistoric times".

To be honest, the repetitious reminders of what information is lacking begins to take on a tedious quality at this point. It is useful to know what we don't know but you can

only make so much out of an article (or a chapter) based on a lack of knowledge. It is, fortunately, at this point that the authors begin their discussion of Poike peninsula and their research there. While they remind us that prior to their study hardly anything was known about prehistoric land use and landscape history in the area, they say that part of the reason why might be because the: "Peninsula is in an isolated position, cannot be reached by road or path and is closed by a cattle fence, so that tourists and even natives hardly ever go there" – part of which is probably true, part of which is undeniably untrue.<sup>4</sup>

Poike Peninsula is the poster boy for Easter Island erosion. It was once part of the great, forest-covered island where possibly as many as 16 million palm trees once grew. Today it is barren except for the yellow grass that blows in the wind (and the Eucalyptus trees that grow in the caldera of Pua Katiki, the volcanic summit of the Peninsula). What the authors found in their study is a litany of processes that reduced the Peninsula to its present state: remains of burned palm trunks, pockets of charcoal, layers of ash, charred nutshells of the extinct palm,<sup>5</sup> thin charcoal linings near root tubes, fireplaces (*umu*) dug below burned layers or placed above burned palm stumps, stacked layers of fine-grained (and therefore transported) charcoal above the burned layer, and soil baked red at the base of charcoal veins. All of these indicate human forest clearing and burning and the authors even know how: the palms were chopped off only a few centimeters above the soil surface, leaves and other materials were removed, the trunks were taken out, and everything else was set ablaze.

And the authors claim to have an idea when, too – radiocarbon dating puts the beginning of fire clearing into the second half of the 13<sup>th</sup> century, with palm root relics from Rano Raraku possibly indicating the time of the first

<sup>3</sup>Grau makes a passionate argument that the extinct Easter Island palm is in fact *Jubaea chilensis* but each building block in the argument is qualified in a way that prevents it from being totally convincing. Fossil pollen is morphologically similar to *Jubaea chilensis*, he says; endocarps are practically identical; trunk molds and roots are similar; the Central Zone of Chile was covered with the *Jubaea* palm, suggesting the possibility of dispersal westward across the Pacific (a theory proved by seed dispersal experiments, however); the *Jubaea* palm is, according to Grau, an ideal species for Rapa Nui, although this might be said for other species as well. With the exception of some experiments plagued by poor management, the *Jubaea* palm will apparently grow on Easter Island and there is a *similarity* between the *niu* glyph of Rongorongo writing and the shape of the *Jubaea* palm (although it would be easy to speculate that *Paschalococos dispersa* looked the same; and finally, *promising* research is being conducted on carbonized remains of woody species of palms from Easter Island that I'm guessing may presumably prove beyond the shadow of a doubt what the palm is. But these qualifications are a far cry from John Dransfield's more confident if reserved position, which I cite for the sake of clarity and balance. From Zizka (1991), Dransfield notes dryly but unequivocally: The extinct Easter Island palm is "of unknown habit known only from subfossil endocarps"; "...with evidence from endocarp alone, it is not possible to place the Easter Island cocoid palm with certainty within any known genus. It seems most closely allied to *Jubaea chilensis*, but the endocarps are nevertheless significantly different in size and shape and pores position from those of *Jubaea chilensis*. \*\*\* "I believe it is misleading to describe the Easter Island palm as a species of *Jubaea* as there are no floral details to support this and by doing so there is a suggestion that the extinct palm may have been similar in habit, and for this there is absolutely no evidence. I have thus described a new genus, *Paschalococos*, in order to emphasize the fact that until more remains of the extinct palm become available, it is impossible to equate accurately the palm with any known extant genus". This may provoke some howling from the *Jubaea* camp, but I humbly suggest someone should disprove Dransfield's position or let's stick with *Paschalococos dispersa* – because we wouldn't have a need or use for *Paschalococos dispersa* if we were certain the extinct Easter Island palm was in fact *Jubaea chilensis*.

<sup>4</sup> While Poike is undeniably isolated, relative to the rest of Easter Island, it is simply untrue that there are no roads there. I have driven on two different sets of roads out onto and back from the Peninsula, starting from the cattle farm where the south coast road turns north. Today, access by motor vehicle is prohibited but access by foot or on horseback is not at present prohibited. It is true, however, that few people – tourists, islanders, or scientists venture into this largely unexplored area of the island.

<sup>5</sup> Traces of gnawing by rats on some nuts are evidence that they had already lain at ground surface before the fires.



clearing was only about 150 years before the second and final clearing. But evidence of planting pits and signs of attempts to work the soil suggests there was a short episode for, at best, a few years or decades' duration of low-intensity horticulture after the palm-forest clearing. The authors provide a timeline (and illustration), ranging from 1450 to about 1675 demonstrating prehistoric phases of land use and soil degradation for a down-slope segment in the southwest cliffs of Poike and relate that undisturbed basal layers in the east and south and north-west of Poike show evidence that horticulture was abandoned there with the onset of soil erosion.

And that marked the beginning of the end. Sheet erosion after forest clearing lead to gullying and micropedimentation<sup>6</sup>, while use of the grasslands for large herds of grazing animals and regular burning of the grasses compacted the soil and triggered linear erosion. As the authors put it, "40 years of gully formation and 30 years of sheep grazing took its toll". Some of this seems to fly in the face of what appears to be the first centuries of settlement that were characterized by a sustainable subsistence economy adapted to the environment. Indeed, the palm nuts alone seem to be quite a food source – an average yield of 100 kilograms (220 pounds) of nuts from a fully-grown palm tree multiplied 16 million times must have represented an enormous food potential. But this never seems to get much press.

Returning to the ultimate causes of deforestation on Easter Island, the authors address some of the various theories – natural *versus* human – that may offer some explanation. "Recent climate modeling suggests", they say, "that the various El Niño effects compensate each other in the southeast-Polynesian region, ... making the climate catastrophe-hypothesis quite improbable". They refer again to Bahn and Flenley (2003) and the theory of extensive wood use for fuel<sup>7</sup>, technical purposes, housing construction, and moving and raising the *moai*. Citing Flenley (1993), the authors note that palynological studies date the beginning of forest clearing to around 800 CE and the almost total extinction of the palm forest to the 15<sup>th</sup> century, which corresponds to the climax of the *moai* culture. The authors also take on those who would blame deforestation on the Little Ice Age by noting that Bahn and Flenley (2003) can show that the palm forest survived much stronger climatic fluctuations than the Little Ice Age during the last 37,000 years without deforesting the island. The authors mention a few other opponents of human-caused deforestation but state nevertheless that "the latest research results, presented in this chapter, are unequivocal evidence of anthropogenic destruction of the forest of Easter Island" – a phenomena brought about no doubt through population growth and the demand for cleared land where intensification of horticulture would require forest-clearing. Other woody plant species, like the *toromiro* (*Sophora toromiro*) probably van-

ished soon afterwards, followed by extinction of the birds that relied on a forest environment.

Things didn't get better. The absence of forest cover meant the islanders were exposed more intensively to solar radiation and frequent strong downpours, and gale-force winds probably caused great, temporary, but frightening floods. This may have increased the use of caves by islanders. The authors speculate that the islanders probably didn't understand the cause of the erosion and interpreted it religiously; it's undeniable that people definitely abandoned the highly eroded areas of Poike. Then came the innovations – stone cover, *manavai*, lithic mulching, but there would never be a recovery. The loss of the palm, the onset of climatic conditions, the destruction of crops, houses, and ceremonial centers due to runoff, competition for land, and problems with the food supply all conspired to coalesce into a catastrophe.

While the authors say that the goal of future research will be to test whether the detailed results obtained for the land-use history of Poike Peninsula are valid island-wide, the ultimate statement that "Human impact, not natural catastrophes, caused change within the system" is where this story leads.

Now, having covered all this territory, and especially in so far as I have mentioned Mieth and Bork's delightful volume *Easter Island - Rapa Nui: Scientific Pathways to Secrets of the Past*, one might reasonably wonder if *Soils and Societies* is a book I'd recommend for Easter Island researchers or Rapanuiphiles on the basis of this chapter alone and I'd have to say no. At \$95, it's pricey and that's a lot to pay unless you're really unless you're really into soil. My recommendation? Check the book out from your local university library or obtain it through inter-library loan and read (or photo-copy) this valuable and undeniably comprehensive chapter and add it to your collection of the latest research in Easter Island studies.

And if you don't have *Easter Island - Rapa Nui: Scientific Pathways to Secrets of the Past*, you should order one now.

## CHAPTER LIST

- Chapter 1: "Soils, Soil Knowledge and Environmental History: An Introduction" by J.R. McNeill and Verena Winiwarter
- Chapter 2: "An Introduction to Soil Nutrient Flows" by Robert S. Shiel
- Chapter 3: "Exploitation and Conservation of Soil in the 3000-Year Agricultural and Forestry History of South Asia" by R.J. Wasson
- Chapter 4: "A Soils History of Mesoamerica and the Caribbean Islands" by Tim Beach, Sheryl Luzzadder-Beach and Nicholas Dunning
- Chapter 5: "Wetlands as the Intersection of Soils, Water

<sup>6</sup> The process of deposition of fine solid material from a state of suspension or solution in a fluid.

<sup>7</sup> The authors do note that extraction of timber seems to have been more important for uses other than firewood, as can be deduced from the almost complete absence of burned pieces of trunks in the soil profiles.

- and Indigenous Human Society in the Americas" by Sheryl Luzzadder-Beach and Tim Beach
- Chapter 6: "A History of African Soil: Perceptions, Use and Abuse" by Kate B. Showers
- Chapter 7: "Prolegomena to a History of Soil Knowledge in Europe" by Verena Winiwarter
- Chapter 8: "Nutrient Flows in Pre-Modern Agriculture in Europe" by Robert S. Shiel
- Chapter 9: "Human Interaction with Soil-Sediment Systems in Australia" by R.J. Wasson
- Chapter 10: "The Dynamics of Soil, Landscape and Culture on Easter Island (Chile)" by Andreas Mieth and Hans-Rudolf Bork
- Chapter 11: "Know Your Soil: Transitions in Farmers' and Scientists' Knowledge in Germany" by Frank Uekoetter

#### REFERENCES AND SUGGESTED READING

- Bahn, P. and J. Flenley. 1992. *Easter Island Earth Island*. London: Thames and Hudson.
- Castleden, Rodney. 1998. *The Stonehenge People: An Exploration of Life in Neolithic Britain*. Free Press.
- Flenley, J. 1993. The Palaeoecology of Easter Island, and its Ecological Disaster in *Easter Island Studies: Contributions to the History of Rapa Nui in Memory of William T. Mulloy* (Steven Roger Fischer, ed.:7-15; 27-45). Oxford: Oxbow Monograph 32.
- Flenley, J. and P. Bahn. 2003. *Enigmas of Easter Island*. Oxford: Oxford University Press.
- Grau, J. 1998. The *Jubaea* palm, Key in the Transportation of *Moai* on Easter Island in *Easter Island in Pacific Context: South Seas Symposium*. Los Osos: Easter Island Foundation.
- Hunt, T. L. and C. P. Lipo. 2007. "Rethinking Easter Island's Ecological Catastrophe." *Journal of Archaeological Science* 34:485-502.
- Mieth, A. and H.-R. Bork. 2004. *Easter Island - Rapa Nui: Scientific Pathways to Secrets of the Past*. Department of Ecotechnology and Ecosystem Development, Ecology Center, Christian-Albrechts-Universität zu Kiel.
- Plog, S. 1997. *Ancient Peoples of the American Southwest*. London: Thames and Hudson.
- Skottsberg, C. 1920-56. *The Natural History of Juan Fernandez and Easter Island*. 3 vols. Uppsala.
- Stevenson, C. M. and S. Haoa. 1999. Diminished Agricultural Productivity and the Collapse of Ranked Society on Easter Island in *Archaeology, Agriculture and Identity*. Kon-Tiki Museum.
- Thomas, D. H. 2000. *Exploring Native America*. Oxford: Oxford University Press.
- Toulmin, C. 2006. On Fertile Ground. *Nature* 442:985.
- Zizka, G. 1991. *Flowering Plants of Easter Island*. Frankfurt: Palmengarten.



#### Life and Solitude in Easter Island

Dario Verdugo-Binimelis

Published by AuthorHouse<sup>1</sup> (2007)

ISBN 978-1-4259-8228

Available in hardcover (140 pages) for \$24.99 or soft cover (119 pages) for \$16.99 from Amazon.com

Foreword by Juan Grau

Review by Shawn McLaughlin

Reluctant as I often am to purchase self-published books because of the liabilities associated with them (see my review of Jeff Barbour's *Blue Planet & Beyond: ... in the last Rapa Nui Journal* for a discussion on how horrible this can be), *Life and Solitude in Easter Island* caught my attention because it wasn't attempting to be a scientific or historical text but a memoir of a time on the island that few Rapanuiphiles, and even fewer people generally, can probably appreciate unless they were there – the early 1950s.

In particular, the author, Darío Verdugo-Binimelis, MD, a physician who received his training in the Chilean Navy, early one day in November 1952 saw in the Chilean newspaper *El Mercurio* an advertisement for a physician to carry out a two-year stint on Easter Island. And, after a family discussion (including Darío's wife Adriana and their four sons; family plays a very important role in this book<sup>2</sup>), they all said, "Why don't we just go to Easter Island?" It really was that simple. Theoretically, and even philosophically, anyway. Until the final paperwork was processed and the then 40-year-old physician was told he was qualified to go to Easter Island. That's when the real fear set in.

But I'm getting ahead of myself. In the introductory material, the author says he wrote the book 50 years after the fact to 1) memorialize his Rapa Nui experience before it faded from memory; 2) expose himself to a kind of self-therapy in dealing with the sadness that nostalgia brings; 3) awaken the conscience of the leadership in Chile as to what's happening on the island today; and 4) emphasize the "Easter Island/Earth Island" metaphor. The author says the book is not meant to be scientific or historical but it is both and neither, which I'll elaborate more on below. In the course of nearly a dozen chapters, the author takes us from his family's bittersweet departure from Chile aboard the old steamship *Allipén*, the 11-day journey across the Pacific to the island (with cramped quarters and yet fun adventures along the way, including a moment of panic when they thought one of their sons had fallen overboard), and their arrival on an island with no electricity, no running water, no

<sup>1</sup> AuthorHouse is a self-publishing company.

<sup>2</sup> So strong is the family connection that the author more or less gets permission from his own mother and father before making the journey to Easter Island. And in the Afterword, written by the author's four sons – Pedro, Darío Jr., Roberto, and Gonzalo – the importance of family is repeated several times. In some ways a better title for the book would have been *Family and Solitude in Easter Island*.